

Camp Thomas, Arizona, 3d.
Yuma, Arizona, 3d.
Fort Yates, Dakota, 13th.

ZODIACAL LIGHT.

Pensacola, Florida, 5th.
Elk Falls, Kansas, 18th.
Nashville, Tennessee, 22d, 23d, 26th, 29th.
Northport, Michigan, 31st.

NOTES AND EXTRACTS.

The following meteorological summary and table are taken from the July report of the "Tennessee Weather Service":

SUMMARY.

Mean temperature, 74°.

Highest temperature, 98°, on the 27th at Grief.
Lowest temperature, 56°, on the 10th at Andersonville and Beech Grove.
Range of temperature, 42°.
Mean daily range of temperature, 14°.
Greatest daily range of temperature, 31°, on the 2d at Andersonville, and on the 20th at Grief.
Least daily ranges of temperature, 0°, on the 7th at Smithville; 1° on the 4th and 6th at Milan; on the 14th at Riddleton; and on the 15th and 30th at McMinnville.
Mean depth of rain, 3.88 inches.
Greatest depth of rain, 6.99 inches at Gadsden.
Least depth of rain, 1.20 inches at Grandview.
Average number of clear days, 9½.
Average number of fair days, 11.
Average number of cloudy days, 10½.
Average number of days on which rain fell, 9½.
Prevailing direction of wind, southwest.

Abstract of meteorological observations for the month of July, 1883, as reported to the Bureau of Agriculture, &c., of Tennessee, by voluntary observers in co-operation with General W. B. Hazen, Chief Signal Officer, U. S. A.

County.	Station.	Latitude north.	Longitude west of Washington.	Temperature.					Wind.				Number of days—											On which rain fell, including hail, snow, and sleet.	Total rainfall, including hail, snow, and sleet (in inches).	Observers.			
				Mean of 7 a. m.	Mean of 2 p. m.	Mean of 9 p. m.	Average monthly.	Highest.	Date.	Lowest.	Date.	Prevailing direction.	Greatest force.	Scale 0 to 10.	Date.	Clear.	Fair.	Cloudy.	Auroras.	Dew.	Fog.	Frost.	Lunar halos.				Solar halos.	Hail storms.	Thunder storms.
Anderson	Andersonville	36 15	86 05	66	82	74	74	96	22	56	10	n.	br.	22	1	20	9			3	5					1	8	3.06	J. K. P. Wallace, 30d.
Bedford	Flat Creek	35 30	84 40	73	84	73	77	90	3	62	10	n.w.	br.	24	10	11	10			18	4					14	14	4.20	William Hart.
Blount	Maryville, 960 ft.	35 45	79 00	72	78	70	70	96	5	66	11	w.	br.	15	9	12	10									6	6	2.95	W. H. Henry.
Bradley	Grief	35 11	84 42	74	80	74	79	98	27	62	31	n.	br.	7	3	21	7			2						6	6	1.81	J. T. Cowden.
Campbell	Caryville	36 00	73 30	70	82	69	73	90	22	60	11	se.	br.	13	3	16	12			4						1	1	1.42	Fletcher Smith.
Carroll	Huntingdon	36 00	11 20	74	82	74	77	90	24	62	31	sw.	h.	6	8	15	8			23						1	10	6.35	A. W. Hawkins.
Carroll	McKenzie, 815 ft.	36 10	11 30	78	89	79	82	96	4	68	30	sw.	br.	4	14	14	3			12	1					2	12	4.77	John Brown.
Cheatham	Kingston Springs	36 10	10 04	72	86	77	78	90	3	60	10	se.	br.	8	13	11	7			13	9					3	10	5.10	W. J. Inman.
Coffee	Manchester	35 20	9 04	71	79	72	74	91	3	68	30	n.w.	h.	5	4	18	9									8	8	4.21	Wiley Hickerson.
Coffee	Beech Grove, 1,050 ft.	35 30	9 06	65	82	72	73	90	22	56	10	sw.	br.	8	18	1	12			21						12	14	3.35	B. F. Cheatham.
Cumberland	Grassy Cove	36 00	8 00	54	77	68	64	88	22	57	10	s.	l.		16	4	10			17	15		3			10	15	2.10	Nettie M. Stratton.
Crockett	Gadsden	35 45	12 00	72	83	73	76	91	24	62	10	w.	h.	12	11	13	7									3	14	6.99	M. T. Moore.
DeKalb	Smithville (near)	35 00	8 40	71	82	72	75	88	22	64	9	sw.	l.	23	9	10	9			14						3	9	2.60	P. C. Blum, (29d's.)
Dickson	White Bluff	36 10	10 04	75	85	75	78	95	22	60	30	se.	h.	11	13	7	11			10	4					4	11	5.80	Prof. W. G. McMillan.
Dyer	Dyersburg	36 15	12 20	72	83	74	76	91	2	64	31	se.	h.	12	3	11	17			23	5					4	9	0.45	L. Hughes.
Gibson	Trenton, 450 feet.	35 58	11 58	71	82	73	75	90	25	61	31	sw.	h.	7	12	7	15			22	5					1	12	11	A. S. Curroy.
Gibson	Milan, 440 ft.	35 55	11 46	70	83	73	75	95	24	59	10	se.	h.	8	12	13	6			23						10	11	5.56	M. D. L. Jordan, M.D.
Giles	Pulaski	35 15	10 00	75	85	85	82	92	23	65	10	sw.	h.	24	16	7	8									6	9	2.30	Prof. W. T. Mann.
Greene	Greeneville	36 10	7 49	75	86	77	79	90	24	67	12	sw.	h.	24	16	7	8			3						6	6	2.30	E. Link.
Hawkins	Rogersville	36 22	5 57	70	82	70	74	89	23	63	10	sw.	h.	6	15	10	11			29	1					3	12	3.15	Thos. F. Walker.
Hardeman	Bolivar	35 18	12 00	72	84	75	77	91	21	65	31	se.	h.	20	6	5										2	10	0.44	E. P. McNeal.
Hardin	Savannah	35 20	11 40	70	84	73	70	90	24	61	10	w.	h.	6	12	19	6			19	2					2	5	4.31	H. R. Hinkle.
Haywood	Brownsville	35 36	12 20				79	99	22	61	10	w.	h.	20												2	7	4.80	Daniel Bond.
Henry	Paris	36 33	11 25	74	83	74	77	90	7	65	30	w.	h.	13	7	9	15									2	9	4.90	J. J. Travis.
Humphreys	Waverly	36 00	10 40	70	81	80	77	89	12	60	10	sw.	h.	24	5	11	15			2						2	8	5.08	D. R. Owen.
Lincoln	Howell	35 15	9 30	71	83	69	74	90	21	63	11	se.	br.	8	1	12	18			6						2	15	1.73	O. R. Hatcher, M.D.
McNairy	McNairy Station	35 00	12 00	75	85	73	78	93	23	65	19	se.	h.	24	15	11	5									2	8	4.25	J. H. Blakely.
Montgomery	Sailor's Rest	36 24	10 35									se.	h.	1	14	16				8						2	8	2.66	John Minor.
Overton	Livingston, 966 ft.	36 23	8 17	73	81	70	75	88	23	61	9															2	8	3.63	J. A. Laughlin.
Obion	Troy	36 20	12 10									h.	12	18	2	11										2	8	5.70	W. H. Caldwell.
Polk	Benton, 880 ft.	35 10	7 45	75	86	77	80	97	22	64	30	sw.	h.	7	9	10	10			8	2					11	8	1.83	Joe Hood.
Rutherford	Murfreesboro'	35 50	9 25	72	83	73	76	91	3	63	10	sw.	br.	7	1	4	10									9	11	2.84	H. H. Chayton, (15d's.)
Rutherford	Florence Station	35 53	9 26	72	87	73	77	95	24	63	10	n.w.	br.	12	13	11	7			1						2	9	2.58	C. F. Vandeford.
Rhea	Grand View, 1,635 ft.	35 45	7 48	69	82	67	74	94	20	49	11	sw.	h.	7	18	12	15			29	3					2	7	1.20	Hattie R. Stratton.
Smith	Riddleton, 548 feet.	36 19	9 07	70	82	72	74	91	21	57	19	sw.	h.	16	2	15	14			25	11					3	11	3.65	S. P. Ferguson.
Smith	Alexandria (near)	35 30	8 56	77		74	75	91	22	65	30	se.	l.		2	18	11			2						2	12	4.59	Irenus Beckwith.
Tipton	Covington	35 20	12 38	72	86	72	77	93	21	61	10	se.	br.	24	10	9	12			23						5	8	3.34	T. W. Roane, M.D.
Williamson	Franklin	35 50	9 48	70	82	73	75	89	3	68	30	n.w.	h.	16	5	6	17			11	2					5	10	3.88	Samuel Henderson.
Warren	McMinnville	35 45	8 45	73	81	77	77	93	22	66	10	n.	h.	17	11	8	12									1	8	3.85	R. M. Reams.

The "Iowa Weather Service," under direction of Dr. Gustavus Hinrichs, has forwarded the following advance proof of the July report of that service:

The weather of July, 1883, was very favorable to the crops, being fair, nearly normal in temperature, with an excess of rainfall, and southerly winds prevailing.

The mean temperature of the air was but a little over one degree below normal; last year July was nearly five degrees below normal. The number of hot days has been high, especially during the first and last decade, while the middle decade was cool.

Insolation has been high, because, even during the stormy period, cloudy days were rare, and during the month clear days were numerous. The sun thermometer exceeded one hundred and forty degrees on twenty-one days; its highest reading was one hundred and sixty-one degrees on the 23d.

The total rainfall was below normal in southern central Iowa, from Union to Jasper counties; in the balance of the State it was considerably above normal, averaging about six inches in the northwest and in the southeast, and nine inches in the northeast. The highest rainfall, of fourteen inches,

for the month, was measured at Decorah. The number of rain days averaged ten for the east and northwest, and about six for the balance of the State.

As usual during July, very heavy rains have occurred, but only in the north. The highest rainfall measured on one day was nearly six inches, at Homedale, south of Sibley, in Osceola county, on the 23d; next to this stands Algona, Kossouth county, with over five inches on the same date. But the most notable rain period of the month occurred in northeastern Iowa, from the 20th to the 23d inclusive, giving very nearly ten inches of rain in Howard and Winneshiek counties.

No tornadoes have occurred in Iowa, but several squalls have visited parts of Iowa; yet the most destructive of these storms have but touched Iowa. The squall of the 4th started about 5 p. m. in central Iowa, and reached southeastern Iowa about 9 p. m.; it was not very severe. The squall of the 12th started about 6 p. m. in Black Hawk county, reached the Mississippi in Scott and Clinton counties about 9 p. m., doing much damage by wind and hail; it continued to spread over central Illinois till about 11 p. m. About noon on the 13th another very severe squall started from southwestern Iowa, where considerable damage was done in Fremont and Page counties; the storm increased in fury while spreading over northwestern Missouri till about

3 p. m. Another storm of less severity visited northeastern Missouri and southern Illinois on the evening of the same day. A severe squall with hail reached, on the afternoon of the 18th, into northwestern Iowa, coming from Dakota. A southerly squall reached Polk and Jasper counties early on the 16th.

On the whole, the weather during July has been very fine; bright skies, aglow with ripening sunshine, alternated with enriching rains—summed up in splendid crops of small grain and hay, and excellent pastures, and giving promise of a good crop of corn, for the fall season promises well also.

During the three last evenings of July the northern lights were seen, especially on the 29th.

At the end of May, this year's growing season, counted from April 1st, was sixty degrees in the aggregate ahead of last year's. We had gained nothing more at the end of June, for the last year's June was moderate, the same as this season's June. But during July we gained in the aggregate one hundred degrees over last year's July, so that on the first of August of this year we have received in the aggregate one hundred and sixty degrees of heat more than last year at this period. This fact, together with the fair sky and generally favorable distribution of rainfall, accounts for the greatly superior condition of our crops this year.

Note.—In the present press bulletin the storm record has been given in sufficient detail to help to dispel the exaggerated notions of danger from whirlwinds in Iowa. It will readily be seen that if squalls, extending simultaneously over a large storm front and progressing for hours like a huge wave, are heralded as "tornadoes" at every place they reach, people at a distance will soon wonder that towns exist at all in the northwest, and our own people will be scared into expensive tornado insurance. In time our buildings will be substantial enough to withstand our summer squalls and winter blizzards successfully. As to genuine tornadoes, they are rare and very limited in extent.

The "Missouri Weather Service," has issued the following report for July, 1883:

The temperature during the past month has been considerably lower than the normal July temperature throughout the state. At the central station the mean temperature for the month was 77° 4, which is altogether out of tally with Dr. Engelmann's normal, being 1° 8 lower. There are only five instances since 1837 in which the mean temperature for July has gone below that of last month, at Saint Louis, *i. e.*, in 1839, '40, '48, '49, '63, and '65.

The lowest minimum temperatures were observed in the southwestern part of the state on the 9th and 10th, the lowest 52°, being observed at Greenfield on the 10th. At the central station, and indeed throughout the state, excepting the above, the lowest temperatures were observed on the 29th and 30th. The recorded minimum at the central station for the morning of the 30th was 59° 0, which is lower than any July minimum, excepting in the years 1870, '73, '75, '76, '77, and '82, during the past twenty-three years, at Saint Louis.

The highest temperatures, with but few exceptions,—they being in the southern part of the state—were observed on the 2d. The highest observed reading at the central station was 94° 8, which is lower than the general average maximum temperatures throughout the state. Higher temperatures were also observed nearly all over the state on the 10th, 11th, and 12th.

Throughout the region visited by the storm of the 13th a most remarkable change of temperature was experienced during or after the storm—remarkable on account of the quick change. At one place there was a range of 24° 0 in a half hour, at two others, a range of 28° 0 and 29° 0 in two hours.

The 13th was a day remarkable for the destructive wind storm which passed through the northwestern and northern portions of the state. It originated in the northwest, coming through eastern Nebraska and southern Iowa, in the earlier part of the day. At 12.40 it struck Corning in the extreme northwestern part of the state, and following down the Missouri river valley, Glasgow at about 3 p. m., and Saint Louis at near 6 p. m. The damage done to grain crops and orchards was very great and irreparable. There was also much damage done to buildings of all kinds in unroofing, and in some localities completely wrecking them. The following named places in Missouri suffered most: Stansbury, Burlington Junction, Trenton, Bethany, Linneus, Albany, Jefferson City, Wellsville, Ashburn, Malden, and Saint Louis. There were but few lives lost, two being reported in this state. Near Browning, this state, the C. B. & K. C. passenger train was blown from the track and twenty people injured. In some localities its effects much resembled those of a tornado, but generally it was a remarkably steady, straight blow for upwards of half an hour. The storm was preceded the night before by very brilliant lightning which was visible almost all over the state.

The rainfall has been heaviest in the southwestern part of the state. At the central station it was about the normal amount for July, a little above, taking the mean of the three Saint Louis stations. The storm of the 13th was generally accompanied by but a light rainfall.

In some instances, as at Miami, Pleasant Hill, Shelby, Louisiana, ten miles north of Mexico and Macon City, hail accompanied the storm of the 13th, at some places it being reported as large as ordinary hens' eggs. Hail was also reported at Lexington on the 19th.

At Cairo, Illinois, a light earthquake shock was felt at 11.15 a. m., on the 6th, and at 1.30 a. m. on the 14th.

The following is a summary of meteorological observations

made at the Washburn College, Topeka, Kansas, by Professor J. T. Lovewell, director of the "Kansas Weather Service":

Tri-daily observations.	June 20th to 30th.	July 1st to 10th.	July 10th to 20th.	Mean.
<i>Temperature of the air</i>				
7 a. m.	67.6	73.8	74.2	71.9
2 p. m.	85.9	72.4	88.4	83.9
9 p. m.	73.0	72.4	73.4	72.9
Mean	75.5	74.3	77.3	76.2
<i>Relative humidity, (in per cent.)</i>				
7 a. m.	92	92	90	91
2 p. m.	76	77	72	75
9 p. m.	90	90	87	89
Mean	83	86	83	85
<i>Pressure, as observed.</i>				
7 a. m.	29.15	29.47	28.95	29.19
2 p. m.	29.02	29.06	28.92	29.00
9 p. m.	29.06	29.06	28.91	29.01
Mean	29.07	29.19	28.93	29.03
<i>Miles per hour of wind.</i>				
7 a. m.	8.6	11.5	6.5	8.9
2 p. m.	12.1	17.1	4.1	11.9
9 p. m.	7.0	10.7	3.8	7.2
Total miles	2,103	2,829	2,863	7,795
<i>Clouding, (by tenths.)</i>				
7 a. m.	2.8	3.0	6.5	3.8
2 p. m.	5.2	5.1	4.1	4.8
9 p. m.	1.8	3.0	3.8	2.8
<i>Rain.</i>				
Inches	2.15	3.07	.58	5.80

The period embraced in this report has been rather above average temperature for this season, and we can again record quite a heavy rainfall.

On fifteen days the temperature has reached 90° and upward, the highest being 98°, on June 30th. The lowest temperature was 62°, on June 23d. Highest barometer, July 18th, 29.300, reduced to sea-level and zero, 30.235. Lowest barometer, July 12th, 28.780, reduced, 29, 708.

On June 23d, Just after a heavy rain storm, the air having had a temperature of 65° to 70° all the forenoon, the temperature suddenly rose more than 20° in consequence of a hot current of air from the south. This lasted but half an hour, when the temperature fell as suddenly as it had risen.

On the evenings of the 7th and 8th of July auroras were visible at this station about 9 o'clock in the evening. The wind-travel has been less than any previous month this year, and no very high gales have occurred here. The prevailing wind has been from the south, as usual at this season.

The following extract is reprinted from the report of the Ohio Meteorological Bureau for the month of July, 1883:

The mean height of the barometer, 30,025 inches, was higher than that of either of the three months preceding.

The range of the barometer was the smallest yet recorded in the reports of this bureau. The maximum height was but 30,315 inches, and the minimum height 29,642 inches, making a range of but .673 inch.

The mean temperature, 72° 1, was the highest monthly mean temperature since the observations were commenced by the bureau, but was more than two degrees below the normal mean temperature for July. The highest temperature, 97° 8, which is so far the maximum for the year, was reported from Lima, Allen county, on the 3d.

The lowest temperature reached was but 43°, and was reported from Granville, Licking county. The range of temperature was the smallest so far recorded, being 54° 8.

The amount of precipitation was greater than that of November, December, January, March, or April, but not so great as that of February, May, or June. It was, however, .45 inch greater than the normal rainfall for July.

The greatest depth of rain fell at Quaker City, Guernsey county, being 7.23 inches. The least, 1.55, was at Lebanon.

The mean number of days on which rain fell was 11.2. The rains were nearly all accompanied by thunder and lightning.

Aurora was observed on the last three days of the month.

The following is the rainfall, in inches, at five rain-gauge stations, established by Mr. Mikesell in Fulton county:

Wauseon, 6.44; Franklin township, 4.90; Chesterfield township, 5.24; Pike township, 4.63; Swan Creek township, 4.30.

Number of days on which rain fell at one station, 6; two stations, 3; three stations, 1; four stations, 4; all stations, 5; total, 19.

The railway weather signals were continued during July, and by examination of the reports it is found that eighty-six per cent. of the predictions were verified.

The following extract is taken from the "Monthly Weather Review" of the Dominion of Canada:

NOTES ON THE STORM IN WESTERN ONTARIO ON THE NIGHT 10TH JULY.

The remarkably heavy rainfall which accompanied the thunder storm of

the night of the 10th July, causing such lamentable loss of life and damage to property in the neighborhood of London, made it desirable that a special investigation into the meteorological conditions which prevailed generally throughout the country prior to, during, and after the storm, should be undertaken.

Special reports were accordingly obtained from upwards of one hundred of our correspondents in Ontario, which made it possible to map with a fair approximation to accuracy the areas affected by the storm and the amount of rainfall.

Before commencing the work of mapping the rainfall, the conditions of pressure, humidity and temperature, which had prevailed were closely investigated, using not only the reports from the regular telegraphic stations, but some others received by mail. These additional stations only bring out slight irregularities in the isobars, and such undulations in the isobaric curves as generally accompany showers and thunder storms in the summer season; there was, moreover, nothing in either of the synchronous maps investigated, which in the present state of knowledge of the sequence of meteorological phenomena, would have justified a prediction that an unusual amount of rain would fall that night in western Ontario, nor indeed anything beyond what was predicted, viz: "local showers," such as actually occurred in other parts of Ontario. An investigation of the reports from upwards of a hundred stations brings out the fact, that the belt in which the greatest precipitation occurred, lies in a direction about northwest and southeast, covering an area of nearly twenty miles wide by fifty miles in length, and the path of the storm as described by several observers agrees with this.

Some correspondents state that the storm seemed to turn and come back on them, which would be perfectly true in appearance even if not in fact, for examination of the photographic records of barometric pressure during several thunder storms, shows that each thunder storm is in itself a miniature cyclone; that it, so far as barometric pressure is concerned, generally con-

sists of a comparatively slow fall of barometer; then a sudden or sharp rise of greater or less extent, followed again by a fall and again by a sharp rise; thus showing a series of waves of pressure passing over the country. To an observer it might appear, as the wind changed on the approach of a second depression, that the storm which had passed was returning, when in reality it was the surface wind blowing in towards the approaching depression. At the same time under certain circumstances, a thunder storm might circle round and return to the same spot; this, however, happens but rarely, the general course being as described above, that what may seem to an observer to be the same storm is really only a change of wind to meet a fresh eddy. During the late storm in London it seems to have been a very marked characteristic that there was but little wind, and this is what might have been anticipated, from the fact that those observers who watched their barometers closely state that the fluctuations were very small, in fact hardly appreciable.

This storm will be memorable from the exceptionally heavy rainfall which accompanied it, but apart from this it had no special feature to distinguish it from any ordinary summer storm. The devastation at London appears to have been caused by the exceptional rainfall taking place over both branches of the Thames at the same time; and as the two branches meet as it were, almost end on the river flowing away nearly at right angles to the branches, it seems a matter within the province of hydraulic engineers to decide whether even a much less rain than that which fell on the night of the 10th, might not cause damage to the suburb of Kensington, and further whether one branch should not be diverted so that the junction of the rivers might form an acute angle.

There seems to be a tendency to an increase in the number of these heavy storms, and as the country is now so much cleared up, the water passes more quickly into the streams, whereby a lighter rainfall would now produce as dangerous a freshet as would formerly have been caused by a much heavier rainfall.

Summary of meteorological observations for the month of July, 1883, made to the Illinois Department of Agriculture, Springfield, August 1, 1883. Hours for taking observations: 7 a. m., 2 p. m., 9 p. m.

Stations.		Elevation above sea—feet.	Thermometer.						Barometer.						Wind.		Rain.		No. of days on which cloudi- ness averaged 0.8 or more.	Mean humidity.
County.	Post office.		Highest.	Lowest.	Mean.	Range of.	Highest daily mean.	Lowest daily mean.	Highest.	Lowest.	Mean.	Range of.	Highest daily mean.	Lowest daily mean.	Prevailing direction.	Max. velocity or force in miles per hour.	No. of days on which rain or snow fell.	Total rainfall.		
Northern div'n.																				
Cook	Chicago	657	91.00	50.90	71.00	40.10	82.90	55.60	30.253	29.641	29.972	0.612	30.242	29.671	SW.	4	12	5.43	69.3	
Kane	Aurora	676	91.00	47.00	73.28	50.00	83.00	61.33	30.220	29.630	29.950	0.590	30.200	29.650	SW.	5	10	3.07	78.0	
Lee	Prairieville	725	94.00	56.00	72.00	38.00	84.00	65.00	30.250	29.600	29.922	0.650	30.210	29.630	S.	10	5.00	6	76.1	
Warren	Monmouth	700	97.00	57.00	76.29	40.00	87.00	64.00	29.780	29.180	29.493	0.600	29.760	29.230	N.W.	13	5.66	10		
Peoria	Peoria	460	98.00	52.00	76.90	46.00	86.75	66.78	29.944	29.306	29.630	0.638	29.899	29.364	S.	6	8	3.57	70.0	
McHenry	Marengo	925	93.00	47.00	69.50	46.00	80.20	58.20							SW.	6	7	2.94	5	
Whiteside	Morrison	970	95.00	50.00	72.75	45.00									SW.	6	10	5.17	2	
De Kalb	Sycamore	800	92.00	54.40	70.06	37.60	80.80	58.25							SW.	3	7	5.50	7	
Ogle	Polo		93.00	47.00	70.30	46.00	80.25	58.00							SW.		9	5.02		
Stark	Elmhurst		96.00	55.00	71.22	41.00											10	4.19		
Central division.																				
Sangamon	Springfield	640	95.00	54.00	74.90	41.00	83.70	64.20	30.339	29.690	30.010	0.649	30.275	29.720	S.	5	12	3.77	68.9	
Pike	Griggsville	625	95.00	58.00	75.30	37.00	90.00	63.00	30.350	29.660	30.010	0.690	30.250	29.750	SW.	6	9	2.77	5	
McLean	Normal		99.00	59.00	75.26	40.00	87.00	67.00												
Coles	Mattoon	724	96.00	59.00	75.00	37.00	84.00	65.00							SW.		9	4.64		
Christian	Pana	760	93.00	62.00	77.01	31.00	84.00	68.50							S., SW.	8	8	5.75	10	
Southern div'n.																				
Alexander	Calto	377	92.00	60.00	77.70	32.00	84.50	63.90	30.367	29.749	30.412	0.618	30.310	29.814	SW.	6	14	7.95	73.8	
Union	Anna	625	93.00	57.00	76.21	36.00			30.360	29.770	30.070	0.590			S., SW.	4	7	2.86	3	
Crawford	Palestine		99.00	62.00	75.09	37.00	84.87	65.50							SW.	3	6	8.30	2	
Saint Clair	Mascoutah		96.00	60.00	78.03	36.00												5.60		
Marion	Centradia	492	95.00	58.00	77.00	38.00	85.66	64.66							SW.	5	9	6.95	12	
Hamilton	McLeansboro		94.00	58.00	77.20	36.00	84.70	66.70							SW.	6	9	3.14	3	
Bond	Greenville		99.50	61.00	78.95	38.50	86.60	66.60							S.	6	6	7.50	5	
Perry	Swanwick		92.00	59.00	74.40	33.00	82.00	63.70							S.	5	8	5.24	4	
Pope	Golconda		92.00	65.00	76.62	27.00	83.50	66.25							N.W.	5	11	4.13	4	

